

SPECIFICATION AMENDMENTS

On page 4, the paragraph extending from lines 14-30 is amended to read as follows (Marked up copies of the following paragraphs are appended at the back of this response):

Figure 1 is a generalised dataflow diagram of a system including a routing apparatus according to the present invention;

Figure 2 is a generalised dataflow diagram of a further system including a routing apparatus according to the present invention;

Figure 3 shows the elements of system employing an open systems interconnection (OSI) layer 7 routing apparatus of the form illustrated in Figure 2;

Figure 4 illustrates the configuration of the web server machine of Figure 3;

Figure 5 is a flowchart illustrating a first method for the transfer of invoice data to the invoice routing system of Figure 3;

Figure 6 shows the user interface of an applet used in the method illustrated in Figure 5;

Figure 7 is a flowchart of a method of generating invoices using the invoice routing system of Figure 3;

Figure 8 is a flowchart of an input signal conversion process;

Figure 9 is a flowchart of an output signal conversion process; Figure 10 is a flowchart of a invoice file download process; and

Figure 11 illustrates a mapping definition file used by the system shown in Figure 3.

The paragraph on page 6, extending from lines 25-28, is amended to read as follows:

The present invention may be implemented at various layers of the International Standards Organization (ISO) networking reference model. An application layer, i.e. layer 7, embodiment for the transfer of invoice data, including credit note data and the like, will now be described by way of example.

The two paragraphs on page 8, extending from line 10-15 are amended to read as follows:

The supplier, buyer, head office and fiscal authority computers 15, ... , 22 all interact with the invoice routing system 14 through the agency of the web server machine 23 and do not need to have software other than a JAVA® software-enabled web browser in order to make use of the invoice routing system 14. (Java® is a registered trademark of Sun Microsystems, Inc.)

Referring to Figure 4, the web server machine 23 supports a web server 40 enabled for secure communication, e.g. using SSL (secure sockets layer), a plurality of computer graphics interface (CGI) scripts 41, a file reception process 42 and a file transmission process 43.

On page 8, the paragraph extending from lines 22-30 is amended to read as follows:

Referring to Figure 5, in order to upload invoice data to the invoice routing system 14, the operator of the first supplier computer 15 uses a web browser to "log in" to the web server 40 and establish a secure communication path (step s1). Having logged in, the operator can follow a hypertext link to an invoice file upload page (step s2). The file upload page includes a JAVA software applet. The applet is signed so that it has access to the file system of the first supplier computer 15. As shown in Figure 6, the applet's user interface includes a list box 50 for listing the files to be uploaded, a button 51 for opening a file selection dialog so that the operator can specify the invoice files to be uploaded and a button 52 for starting the file transfer.

On page 9, the paragraph extending from lines 17-23 is amended to read as follows:

The third supplier computer 17 uses an automatic upload process. This process is triggered by scheduling software on the third supplier computer 17 and is effected by a JAVA software application which performs a file transfer protocol (FTP) transmission over a hypertext transfer protocol (HTTP) link to the web server machine 23 and

prohibits operator intervention. The use of FTP over an HTTP link avoids the need for a direct FTP link between the third supplier computer 17 and the invoice routing system 14. The use of this, and the prohibition of operator intervention increases system security.

The paragraph on page 13, extending from lines 1-6 is amended to read as follows:
Following the successful download of an invoice file, individual invoices are also sent to the respective buyer via e-mail in hypertext markup language (HTML) format. These invoice copies may include data, such as value added tax (VAT) registration numbers, that is not included the downloaded invoice file but which is required on printed invoices, which themselves may be a legal requirement.